

Amendments to the Claims

The following listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims

What is claimed is:

1. (Currently amended) A process for identifying a chemical compound for possible use in a medicament for treating a disorder selected from the group consisting of a cardiovascular disorder, an inflammatory disorder, and a disorder of blood vessels said compound modulating an interaction between i) a human EVH1 (Ena-VASP – (*Drosophila melanogaster* enabled vasodilator-stimulated phosphoprotein) – Homology 1) binding domain or a protein having a human EVH1 binding domain and ii) a human EVH1 domain or a protein having a human EVH1 domain, which process comprises:

a) bringing a human EVH1 binding domain or a protein having a human EVH1 binding domain which interacts with a human EVH1 domain or a protein having a human EVH1 domain into contact with a chemical compound to be examined on a surface which consists of a solid body and is coated with a human EVH1 binding domain or a protein having a human EVH1 binding domain;

b) incubating the mixture according to a) with a monoclonal an antibody selected from the group consisting of mAB IE245 and mAB IE273 which said antibody specifically binding binds to a human EVH1 binding domain or a protein having a human EVH1 binding domain or a human EVH1 domain or a protein having a human EVH1 domain or which has an antigen which is fused with or chemically coupled to these domains or proteins;

c) incubating the mixture according to b) with a second antibody which is capable of specifically binding the antibody from mixture b), said second

antibody having an attached label that can be detected biochemically or physicochemically;

d) detecting the label on the second antibody after incubation according to c) by biochemical or physicochemical detection; and

e) identifying the chemical compound thereby detected as a potential medicament for treating a disorder selected from the group consisting of a cardiovascular disorder, an inflammatory disorder, and a disorder of blood vessels.

2. (Canceled)

3. (Currently amended) A process for identifying a chemical compound for possible use in a medicament for treating a disorder selected from the group consisting of a cardiovascular disorder, an inflammatory disorder, and a disorder of blood vessels said compound modulating an interaction between a human EVH1 (Ena-VASP – (*Drosophila melanogaster* enabled vasodilator-stimulated phosphoprotein) – Homology 1) binding domain or a protein having a human EVH1 binding domain and a human EVH1 domain or a protein having a human EVH1 domain, which process comprises:

a) bringing a human EVH1 binding domain or a protein having a human EVH1 binding domain which interacts with a human EVH1 domain or a protein having a human EVH1 domain into contact with a chemical compound to be examined;

b) incubating the mixture according to a) with a monoclonal antibody selected from the group consisting of mAB IE245 and mAB IE273 which said antibody specifically binding binds to a human EVH1 binding domain or a protein having a human EVH1 binding domain or a human EVH1 domain or a protein having a human EVH1 domain or which has an antigen which is fused with or chemically coupled to these domains or proteins;

- c) incubating the mixture according to b) with a second antibody which is capable of specifically binding the antibody from mixture b), said second antibody having an attached label that can be detected biochemically or physicochemically;
 - d) detecting the label on the second antibody after incubation according to c) by biochemical or physicochemical detection; and
 - e) identifying the chemical compound detected as a potential medicament for treating a disorder selected from the group consisting of a cardiovascular disorder, an inflammatory disorder, and a disorder of blood vessels;
- wherein step a) takes place on a solid body, said solid body being coated with a human EVH1 domain or a protein having a human EVH1 domain, the human EVH1 domain or the protein having the human EVH1 domain on said solid body interacting with a human EVH1 binding domain or a protein having a human EVH1 binding domain.

- 4. (Previously presented) The process as claimed in claim 1 or 3, wherein the solid body forms part of a microtiter plate.
- 5. (Previously presented) The process as claimed in claim 1 or 3, wherein the protein having a human EVH1 domain used is VASP (vasodilator-stimulated phosphoprotein) or a fusion protein comprising: i) a first fusion component selected from the group consisting of a VASP and a VASP fragment having an EVH1 domain, and ii) a second fusion component selected from the group consisting of a glutathione S-transferase, a maltose binding protein and a hexahistidine.
- 6-7. (Canceled)
- 8. (Previously presented) The process as claimed in claim 1 or 3, wherein the protein having a human EVH1 binding domain is zyxin or a zyxin derivative consisting of a fusion protein of glutathione S-transferase having the first 142 amino

acids of zyxin fused to the C-terminus of said glutathione S-transferase.

9. (Previously presented) The process as claimed in claim 8, wherein the zyxin derivative comprises a fusion protein which consists essentially of: i) a first fusion component selected from the group consisting of zyxin and a zyxin fragment having a human EVH1 binding domain and i) a second fusion component selected from the group consisting of a glutathione S-transferase and a maltose binding protein.

10-11. (Canceled)

12. (Previously presented) The process as claimed in claim 1 or 3, wherein a polyclonal antibody is used for the incubation according to b).

13. (Canceled)

14. (Currently amended) The process as claimed in claim 1 or 3 43, wherein the monoclonal antibody is mAB IE245.

15. (Currently amended) The process as claimed in claim 1 or 3 43, wherein the monoclonal antibody is mAB IE273.

16. (Previously presented) The process as claimed in claim 1 or 3, wherein the biochemically or physiochemically detectable antibody label of step c) is a radioactive isotope, a fluorescent dye, or an enzyme is used for the incubation according to c).

17. (Previously presented) The process as claimed in claim 16, wherein the enzyme is alkaline phosphatase or β -galactosidase.

18. (Previously presented) The process as claimed in claim 16, wherein the fluorescent dye is a lanthanide complex.

19. (Original) The process as claimed in claim 18, wherein the lanthanide complex used is a europium complex.

20-48. (Canceled)

49. (Previously presented) The process as claimed in claim 1 or 3, wherein the EVH1 domain or protein having a human EVH1 domain is recombinantly prepared in insect cells.

50. (Previously presented) The process as claimed in claim 49, wherein the protein having a human EVH1 domain is VASP or a VASP fragment having the EVH1 domain.